

Remarks

The Office Action dated October 2, 2003 has been carefully reviewed and the foregoing amendment has been made in consequence thereof.

Claims 1-20 are pending in this application. Claims 1, 2, 5, 6, 9-12, 15, 16, 19, and 20 stand rejected. Claims 3, 4, 7, 8, 13, 14, 17, and 18 have been withdrawn.

The rejection of Claims 1, 2, 5, 6, 9-12, 15, 16, 19, and 20 under 35 U.S.C. § 103(a) as being unpatentable over De Briere et al. (US 4,394,345) in view of Johnson (US 6,332,011) is respectfully traversed.

De Briere et al. describe an ultrasonic transducer assembly that positions the ultrasonic transducers adjacent the top surface of a jet pump beam (see Figures 3 and 4) or adjacent the side surfaces of the jet pump beam (see Figures 7 and 8). De Briere et al. do not describe nor suggest positioning the ultrasonic transducers adjacent the bottom surface of the jet pump beam.

Johnson describes a method of scanning a shroud weld that includes positioning a phased array ultrasonic probe on an upper surface of the shroud head flange. Johnson does not describe nor suggest positioning a phased array ultrasonic probe adjacent the bottom surface of a jet pump beam.

Claim 1 of the present application recites a method of inspecting a jet pump beam in a nuclear reactor that includes the step of "positioning at least one ultrasonic phased array probe adjacent the bottom surface of the jet pump beam".

Claim 11 of the present application recites a method of inspecting a jet pump beam in a nuclear reactor that includes the step of "positioning at least one ultrasonic phased array probe adjacent the bottom surface of the jet pump beam".

De Briere et al. and Johnson , alone or in combination, do not describe nor suggest a method of inspecting a jet pump beam in a nuclear reactor as recited in Claim 1 nor a method of inspecting a jet pump beam in a nuclear reactor as recited in Claim 11. Particularly, De Briere et al. and Johnson , alone or in combination, do not describe nor suggest positioning at least one ultrasonic phased array probe adjacent the bottom surface of the jet pump beam. Rather, Johnson describes positioning a phased array ultrasonic probe on an upper surface of the shroud head flange and De Briere et al. describe an ultrasonic transducer assembly that positions the ultrasonic transducers adjacent the top surface of a jet pump beam or adjacent the side surfaces of the jet pump beam. Applicants submit that the ultrasonic transducer assembly shown in Figures 3-8 of De Briere et al. is incapable of positioning at least one ultrasonic phased array probe adjacent the bottom surface of the jet pump beam. Applicants submit that apparatus and description of De Briere et al. teaches away from the methods recited in independent Claims 1 and 11 of the present invention. Specifically, De Briere et al. teaches examining the jet pump beam for cracks from below by positioning ultrasonic transducers adjacent the sides of the beam (see Col. 6, lines 1-10).

As the Federal Circuit has recognized, "it is impermissible . . .to pick and choose from any one reference only so much of it as will support a given position, to the exclusion of other parts necessary to the full appreciation of what such reference fairly suggests to one of ordinary skill in the art." *In re Wesslau*, 147 USPQ 391, 393 (CCPA 1965). See also, *Smithkline Diagnostics, Inc. v. Helena Laboratories, Corp.*, 8 USPQ2d 1468, 1475 (Fed. Cir. 1988) ("claims, entire prior art, and prior art patents must be read 'as a whole'"). Also, if art "teaches away" from a claimed invention, such a teaching supports the nonobviousness of the invention.

U.S. v. Adams, 148 USPQ 479 (1966); *Gillette Co. v. S.C. Johnson & Son, Inc.*, 16 USPQ2d 1923, 1927 (Fed. Cir. 1990). Also, the prior art reference or combination of references must teach or suggest all the limitations of the claims. See *In re Zurko*, 111 F.3d 887, 888-89, 42 U.S.P.Q.2d 1476, 1478 (Fed. Cir. 1997). And the teachings or suggestions, as well as the expectations of success, must come from the prior art, not applicant's disclosure. See *In re Vaeck*, 947 F.2d 488, 493, 20 U.S.P.Q.2d 1438, 1442 (Fed. Cir. 1991). In this case, De Briere et al., "read as a whole", teach an ultrasonic transducer assembly that positions ultrasonic transducers adjacent the sides of the jet pump beam to examine the beam for cracks from below. Also, Applicants submit that modifying the ultrasonic transducer assembly of De Briere et al. with the phased array ultrasonic probes of Johnson will not produce an apparatus that positions phased array ultrasonic probes adjacent the bottom surface of a jet pump. Further, De Briere et al. teach away from the claims of the present application because the apparatus taught by De Briere et al. is incapable of positioning the transducers adjacent the bottom surface of the jet pump beam. Also, Applicants submit that the teachings of their application are impermissibly being used in an attempt to render their claimed invention obvious. Specifically, Applicants' teaching of positioning ultrasonic phased array probes adjacent the bottom surface of a jet pump beam is being combined with the teachings of De Briere et al. to try to render their claimed invention obvious

Further, Applicants respectfully submit that just because one skilled in the art would know how to position an ultrasonic phased array probe adjacent the bottom surface of a jet pump beam after he has read Applicants' application does not make positioning an ultrasonic phased array probe adjacent the bottom surface of a jet pump beam obvious.

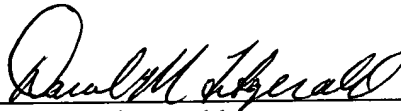
For the reasons set forth above, Applicants submit that independent Claims 1 and 11 are patentable over De Briere et al. and Johnson , alone or in combination.

Claims 2, 5, 6, and 9-10 depend from independent Claim 1, and Claims 12, 15-16, and 19-20 depend from independent Claim 11. When the recitations of dependent Claims 2, 5, 6, and 9-10 and dependent Claims 12, 15-16, and 19-20 are considered in combination with the recitations of Claims 1 and 11 respectively, Applicants respectfully submit that Claims 2, 5, 6, 9-10, 12, 15-16, and 19-20 likewise are patentable over DeBriere et al. and Johnson, alone or in combination.

For the reasons set forth above, Applicants respectfully request that the Section 103(a) rejection of Claims 1, 2, 5, 6, 9-12, 15, 16, 19, and 20 be withdrawn.

In view of the foregoing amendments and remarks, all the claims now active in this application are believed to be in condition for allowance. Favorable action is respectfully solicited.

Respectfully submitted,



Daniel M. Fitzgerald
Registration No. 38,880
ARMSTRONG TEASDALE LLP
One Metropolitan Square, Suite 2600
St. Louis, Missouri 63102-2740
(314) 621-5070